

Scope of Work to Install Doors & Windows at 65, Leyard's Road

The work consists of installing new, Embassy supplied doors and windows at 65, Leyard's Road, a US Embassy owned property. All the work shall be in accordance with recognized US and International Building and Construction codes. Construction shall abide by Embassy rules and regulations including security and safety regulations.

The contractor will provide continuous project management on the job site according to an estimated total completion time of **7 weeks**. Any changes in construction from this Scope of Work shall be approved in advance in writing by the Contracting Officer.

All work described in this Scope of Work shall be completed by the contractor. The contractor shall provide qualified supervisory, technical, and labor personnel capable of meeting the embassy requirements. The labor force shall possess the construction, carpentry, electrical, masonry and painting skills for this project and sufficient staff to accomplish the work in a timely manner. The contractor shall provide all necessary material, tools, equipment, vehicles required for this work.

The contractor should ensure the minimum disturbance and no damages to the existing property of the premises and inside the building.

**** JELD-WEN Energy Star Compliant Doors and Windows will be provided by the embassy. These doors have an inbuilt frame and need to be fitted into a secondary wood frame that the contractor must construct and supply as described in requirements section.**

1. Installation of Doors of size 36"x 80"(4nos) and 30"x 80"(2nos)

1. It is required to remove six numbers of wooden doors, as given in the drawing, taking extreme care to avoid any potential structural damages. Old security alarm wires around the door frames shall be removed by the vendor and keep without any damages for reusing.
2. The grill door needs to be removed as per the site instruction. Vendor may keep the grill door to minimize extra security requirement as explained in no 17th and remove it later if constructional works are not affected. Vendor shall evaluate the need for

demolition around the frame such that the damage could be minimal in the structural part of the walls.

3. All the iron grill doors installed inside of these doors should be removed and installed back using new outer frame of size 1.5" x 1.5" heavy duty box bars with zn-phosphate primer and two top coats. The old grills should be cleaned, scraped and prepared properly to apply zn-phosphate primer and two top paint coats. The modified grill doors should be installed using 4" anchor bolt and welding or with firmly fixed ¾" iron bar supports embedded inside the wall while doing the new door frames. All the accessories in the door grill should be installed back and tested to be fully functional.
4. All excess material and debris from the project must be removed from the site by the end of the project. The US Embassy retains the right to retain any of the removed doors and windows for another purpose, in which case the embassy will notify the contractor and will remove them from the job site.
5. Opening of the walls need modification such that the new doors of size 36" x 80" and 30" x 80" will suit in to each place as shown is the site visit. It is required to build RCC lintel (using four numbers of 10mm top bars) for each wall opening to support the weight of the walls on top of the doors as it may come to exist. The existing lintel may not be usable as the sizes of the doors are going to be changed.
6. The opened wall spaces need to make standard size as per the new doors of sizes having a RCC (10mm top steel) lintel on top. Balance space will be covered using clay bricks and cement mortar if necessary or the space should make bigger to support the size of new doors
7. The wood frame made as per the following requirements should be embedded in to the wall using the clamping collar. It is necessary to level and plumb the frame to avoid any deviation or misalignment of the windows later.
8. Verify the width and the height of the door area are each ½" smaller than the rough opening width and the height
9. Verify the masonry finished door opening is square. Maximum allowable deviation from square is 1/8". Also verify the opening is level and plumb. Maximum allowable deviation is 1/16" for 2' of length
10. The door could be mounted in to the following wood frame before place it in the wall. Any modification or adjustment of the frame or the door need to be done so that the installed door will meet both functional and aesthetical requirements

11. Build a solid wood frame using treated Kempas (2"x 5" – finished size) of the size of the outer frame of the door so that the collar can be screwed in to the wood frame using 6 x 18 x ¾ wood screws.
12. Each door with the inbuilt frame should measure first to get the appropriate frame size as slight deformation and manufacturing defects can be seen. The misalignment/deformation of the door frame or the wood frame need to be properly adjusted/modified so that the functionality becomes standard and smooth. The frame should have one coat of causeway wood preservatives, of CIC Aluminum sealer and two finishing coats of CIC enamel. The vendor should use masking tape or similar to protect the partly painted and finished frame from the masonry works. Any other proposed installation method may be proposed to the Embassy Contracting officer or his/her representative for prior approval.
13. Any gaps present in the wood frame and the door frame need to be filled using paintable silicone (Acrylic Sealant- V-tech, VT-220). The finishing should not have any gaps present around the frames and any part of the complete installation. The finished installation and the plastering work ultimately will work as a single composite unit in the wall.
14. All the painting works and any finishing works after the placement should be done appropriately in both interior and exterior walls using CIC *weather shield* for exterior and *pent a light plus* for the interior.
15. No excessive gaps or opens around doors and wood frame are allowed under any circumstances. If the gaps are found later due to faulty construction, the vendor should fill all the gaps in a manner that the repair will last without reoccurring.
16. Special care should be taken not to damage or destroy the appearance of the finished wood frame inside of the house as it is directly in the interior space of the house.

2. Installation of 29 Windows of size 48" x 48" – 16 nos, 48" x 36" – 3 nos, 48" x 60" – 5 nos, 36" x 36" – 4 nos and 12" x 36" one

1. It is required to remove existing windows, window frames and iron grills as shown in the drawing by taking extreme care to avoid any potential structural damages in any part of the house. Vendor shall evaluate the need for demolition around the frame such that the damage could be minimal in the structural part of the walls in order to install two new windows of various sizes as given in the drawing

2. All the iron grills installed inside of these windows should be removed and installed back using new outer frame using 1.5" x 1.5" heavy duty box bars with zn-phosphate primer and two top coats. The old grills should be cleaned, scraped and prepared properly to apply zn-phosphate primer and two top paint coats. The modified grills should be installed using 4" anchor bolt and welding or with firmly fixed ¾" iron bar supports embedded inside the wall while doing the new window frames. All the accessories in the grills should be installed back and the operable grills should be smoothly functional
3. It is required to build RCC lintel for each wall opening to support the weight of the walls on top of the window. The existing lintel will not be usable as the sizes of the windows are going to be changed.
4. The opened wall spaces need to make standard size having a RCC (four bars of 10 mm tore steel) lintel on top. Balance space on top of the walls will be covered using clay bricks and cement mortar.
5. The wood frame made as per the following requirements should be embedded in to the wall using the clamp and the fastener frame nailed in to the main frame. It is necessary to level and plumb the frame to avoid any deviation or misalignment of the windows later.
6. Verify the width and the height of the window area are each ½" smaller than the rough opening width and the height
7. Verify the masonry finished window opening is square. Maximum allowable deviation from square is 1/8". Also verify the opening is level and plumb. Maximum allowable deviation is 1/16" for 2' of length
8. The vinyl windows should be mounted in to the following wood frame before place it in the wall or, if vendor is quite sure about the dimensional integrity, he can do the placement at the end of fixing the frames in to walls. It is necessary to ensure smoother function of the window sashes and locks at this stage. Any modification or adjustment of the frame or the window need to be done so that the installed window will meet both functional and aesthetical requirements
9. Build a solid wood frame using treated Kempas (finished section of 2"x 4") of the size of the outer frame of the windows so that the collar can be screwed in to the wood frame using 6 x 18 x ¾ wood screws. Each window panel should measure first to get the appropriate frame size as slight deformation and manufacturing defects can be seen.

10. The misalignment/deformation of the vinyl window frame or the wood frame need to be properly adjusted/modified so that the functionality becomes standard and smooth. The wood frame should have external support trim nailed around the frame using 1 ¼" x 1" (treated Kempass with wood preservatives) so that the frame can be properly embedded in the wall.
11. The frame should have one coat of causeway wood preservatives, one coat of Dulux Wood Aluminum Sealer and two coats of Dulux Gloss Plus in white color. The vendor should use masking tape or similar to protect the partly painted and finished frame from the masonry works. All the finish should have spotless white color appearance.
12. Any gaps present in the wood frame and the window frame need to be filled using paintable silicone (Acrylic Sealant- V-tech, VT-220). Finally it is required to put a wood trim of 15mm x 1" inside of the frame so that the trim will be nailed using brass panel pins of ¾" size. The finishing should not have any gaps present around the frames and any part of the complete installation. The finished installation and the plastering work ultimately will work as a single composite unit in the wall.
13. Placement of the wood frame should be such that the window frame should be inside the wall about 1" from the finished surface. The exterior wall should be finished having a slight slope outward to drain out the storm water coming down from the slots of outer frame of the vinyl windows. Such slope will allow drain out the water in to the floor instead of on the wall. Essentially the sloped sill need water proofing and painting to avoid infiltration of water through the gaps or masonry finish.
14. Gap between the window frame and the exterior wall need plastering back. It is required to add lime for the masonry plaster – Sand: Lime – 12: 1 ratio. After curing and drying the applied masonry plaster it is required to apply the finishing acrylic sealant along the open lines between vinyl window frame and the dried wall plaster.
15. All the painting works and any finishing works after the placement should be done appropriately in both interior and exterior walls using CIC *weather shield* for exterior and *pent a light plus* for the interior. Vendor should paint complete wall from floor to roof ceiling whenever a replacement is done in that particular wall.
16. No excessive gaps or opens around windows and wood frame are allowed under any circumstances. If the gaps are found later due to faulty construction, the vendor should fill all the gaps in a manner that the repair will last without reoccurring.

17. Special care should be taken not to do damage or destroy the appearance of the finished wood frame inside of the house as it is directly in the interior space of the house. Secondly the vendor should take extra effort not to damage the vinyl window or the frames during or after the construction. Need to use polythene and tape to cover up each window so that no scratching marks or damage in the glass and frame. Any damage or broken window during and after construction, happened solely due to the contractor negligence, will be replaced at 100% contractors cost.
18. Any other construction or finishing up works to ensure the functionality of the windows and the appearance after installation need to be carried out by the vendor unless otherwise the cost of such item is beyond the original SOW and largely deviate from the guidance given in the field visit.

Note

- a. Vendor should be prepared to re build the small walls less than minimum width of 24" and install a single lintel covering multiple windows when multiple windows exist in line with narrow separations. We will provide guidance during the site visit.
- b. All the rooms need to be completely repainted with CIC emulsion, brilliant White paint including ceilings. Rest of the area around the doors needs painting (Interior CIC Emulsion Brilliant White, Exterior CIC Weather shield). All the wall damages need re plastering and proper surface preparation before painting.
- c. The rooms should be cleaned and be ready to use at the end of the project. Vendor should never do any damages on the existing floors, walls, ceilings or any other built item near the doors and windows. At the end of the project vendor should hand over the site as in its original condition having done complete cleaning, painting, vacuuming and mopping floors etc.
- d. Any other construction or finishing up works to ensure the functionality of the doors and windows and the appearance after installation need to be carried out by the vendor unless otherwise the cost of such item is beyond the original SOW and largely deviate from the guidance given in the field visit.
- e. The contractor must close all the door or windows opening at the end of each working day, using 1" thick heavy plywood or suitable iron grills so that no

accidental breakage or burglary happen through the opening. Site must never keep unsecure at the end of the working day.

The Embassy reserves the right to inspect the quality of installation works and to order corrections or replacement, at no additional expense to the Embassy, of items determined as not meeting the minimum standards.

The contractor shall clean up left over materials from the site(s) prior to the project's being determined as complete. No trash or construction debris shall be left in the project area prior to acceptance by the Embassy.

The contractor shall make every reasonable effort to keep the job site clean during the duration of the project. Any defects, settlements or cracks in the newly constructed walls or lintel and filling up of windows, within two years of time, shall lead the contractor doing repair or replacement free of charge to the US Embassy.